

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

What is claimed is:

1. (Currently Amended) A computer implemented, price optimization system for optimizing a preferred set of prices for a subset of a plurality of products, comprising:

a rule prioritizer ~~for configured to iteratively prioritize prioritizing a plurality of relaxable~~ rules, and for ~~iteratively~~ identifying at least one lower priority infeasible rule from the plurality of ~~relaxable~~ rules;

a rule relaxation module ~~for configured to incrementally relaxing relax~~ any infeasible rule of the plurality of ~~relaxable~~ rules which has a lower priority than the at least one lower priority infeasible rule, enabling the at least one lower priority infeasible rule to become feasible;

a database ~~for configured to store storing~~ initial prices for a plurality of products;

a product designator ~~for configured to designate designating~~ a subset of products of the plurality of products, wherein the number of products in the subset of products is less than the number of products in the plurality of products; and

an optimization engine ~~for configured to optimize optimizing~~ prices for products in the subset of products, while maintaining the initial prices of all other products of the plurality of products and wherein the optimizing of prices complies with the relaxed any infeasible rule of the plurality of rules.

2. (Currently Amended) The price optimization system, as recited in claim 1, wherein the product designator for designating a subset enables a number N to be designated, and wherein

the product designator selects no more than N products of the plurality of products to form the subset of products, and wherein the selected no more than N products has the largest impact on the optimization of prices of any subset of no more than N products of the plurality of products.

3. (Previously Amended) The price optimization system, as recited in claim 2, wherein the optimization engine provides an optimization of total profit for the subset of products.

4. (Previously Amended) The price optimization system, as recited in claim 3, wherein the optimization engine provides initial prices by optimizing prices for all of the plurality of products.

5. (Currently Amended) The price optimization system, as recited in claim 4, wherein further comprising a new data source, wherein the new data source provides new data subsequent to the optimization engine providing initial prices by optimizing prices, and wherein the new data source includes an econometric engine and a financial model engine.

6. (Previously Amended) The price optimization system, as recited in claim 5, wherein the new data includes new price data and new price bound data, and wherein new price bound data includes changes in costs, base price, competitive prices, point-of-sale data, product information and store information.

7. (Previously Cancelled)

8. (Previously Cancelled)

9. (Previously Amended) The price optimization system, as recited in claim 1, wherein the optimization engine provides initial prices by optimizing prices for all of the plurality of products.

10. (Currently Amended) The price optimization system, as recited in claim 1, wherein further comprising a new data source, wherein the new data source provides new data subsequent to the database storing the providing initial prices for the plurality of products by optimizing prices, and wherein the new data source includes the an econometric engine and the a financial model engine.
11. (Previously Amended) The price optimization system, as recited in claim 10, wherein the new data includes new price data and new price bound data, and wherein new price bound data includes changes in costs, base price, competitive prices, point-of-sale data, product information and store information.
12. (Previously Cancelled)
13. (Previously Cancelled)
14. (Currently Amended) In a computer system, a method for computing a preferred set of prices for a subset of products of a plurality of products, comprising:
 - prioritizing, using the computer system, a plurality of relaxable rules, wherein the prioritizing of the plurality of rules is iterative;
 - identifying, using the computer system, at least one lower priority infeasible rule from the plurality of relaxable rules, wherein the identifying of the plurality of rules is iterative;
 - incrementally relaxing, using the computer system, any infeasible rule of the plurality of rules which has a lower priority than the at least one lower priority infeasible rule to allow the at least one lower priority infeasible rule of the plurality of rules to become feasible;
 - storing, using the computer system, initial prices for a plurality of products;
 - designating, using the computer system, a subset of products of the plurality of products, wherein the number of products in the subset of products is less than the number of products in the plurality of products; and

optimizing, using the computer system, prices for products in the subset of products, while maintaining the initial prices of products of the plurality of products that are not in the subset of products, and wherein the optimizing of prices complies with the relaxed any infeasible rule of the plurality of rules.

15. (Currently Amended) The method, as recited in claim 14, wherein the designating a subset comprises:

allowing a number N to be designated; and

selecting no more than N products of the plurality of products to form the subset of products, wherein the selecting no more than N products has the largest impact on the optimizing of prices of any subset of no more than N products of the plurality of products.

16. (Previously Amended) The method, as recited in claim 15, further comprising providing, using the computer system, an optimization of total profit for the subset of products.

17. (Previously Amended) The method, as recited in claim 14, further comprising providing, using the computer system, initial prices by optimizing prices for all of the plurality of products.

18. (Previously Amended) The method, as recited in claim 17, further comprising providing, using the computer system, new data subsequent to providing initial prices by optimizing prices.

19. (Previously Amended) The method, as recited in claim 18, wherein the new data comprises new price data and new price bound data, and wherein new price bound data includes changes in costs, base price, competitive prices, point-of-sale data, product information and store information.

20-24 (Previously Canceled)

25. (Previously Added) The price optimization system, as recited in claim 1, wherein the optimization engine provides an optimization of total revenue for the subset of products.

26. (Currently Amended) The price optimization system, as recited in claim 1, wherein the optimization engine provides an optimization of ~~total~~ sales volume for at least one product of the subset of products.

27. (Previously Added) The method, as recited in claim 15, further comprising providing, using the computer system, an optimization of total revenue for the subset of products.

28. (Currently Amended) The method, as recited in claim 15, further comprising providing, using the computer system, an optimization of ~~total~~ sales volume for at least one product of the subset of products.